Exploring perceptions and attitudes toward pain in surgical trauma patients in rural Guatemala: a qualitative study

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Background

- Pain is nearly universal following traumatic injury and influences recovery, outcomes, and patient satisfaction.
- Pain perception, expression, and coping may be shaped by biological, psychological, social, and cultural factors.
- These factors remain poorly characterized among underrepresented patient populations.

Objective: To explore the experiences, attitudes, and expectations toward pain among hospitalized trauma patients at a public hospital in rural Guatemala, to inform culturally responsive, patient-centered strategies for pain management.

Methods

- Qualitative study using semi-structured interviews (COREQ reporting guideline)
- Consenting adults (≥18 years) admitted to the surgical trauma service at Hospital Nacional de Coatepeque, a public referral hospital in southwestern Guatemala, May 2025
- Purposive sampling for varied ages, genders, and injuries. Thematic saturation reached at 20 interviews (8–46 min). No patients declined
- Interviews explored pain experiences, coping, interactions with providers, and expectations for pain management. Pain rated with a Spanish Wong-Baker FACES scale
- Exempt from ethical review by COMIRB (#25-0713) and the hospital Committee for Bioethics and Scientific Investigation (minimal risk)

Analysis workflow

1. Bedside interviews in Spanish, audio-recorded
2. Transcribed verbatim
3. Translated to English, reviewed by bilingual researchers
4. Two researchers coded independently (Dedoose)
5. Inductive thematic analysis (Braun & Clarke) → themes

Results

Participant characteristics (n = 20)

Mean age (SD), years	42.8 (24.1)
Sex, male / female	12 (60%) / 8 (40%)
Mean days since injury (SD)	9.6 (8.5)
Mean pain at interview (SD)[a]	3.2 (3.0)
Injury[b]	
Lower extremity	13 (56%)
Upper extremity	6 (26%)
Hip	2 (10%)
Ribs	1 (5%)
Head	1 (5%)
Occupation	
Homemaker	6 (30%)
Agriculture	5 (25%)
Laborer	3 (15%)
Other[c]	4 (20%)
Not specified	2 (10%)

[a]10-point numerical pain rating scale. [b]Patients may report more than one injury type. [c]Carpenter, supervisor, engineer, student (1 each).

Pain trajectory

- Severe early pain with physical, emotional, and functional distress that generally improved over time
- Relief attributed to medications, surgery, rest, time, and outlook
- Psychological coping, faith, and family responsibilities were central to resilience and recovery

3.2 / 10
mean pain score at interview, despite narratives of substantial suffering

Five interrelated themes

1. **Lived experience and trajectory of pain**
   "I spent about an hour crying from the pain. Because I couldn't stand it anymore." (P20)
2. **Coping, adaptation, and psychological endurance**
   "The last thing the pain should take away is the fighting spirit." (P18)
3. **Spirituality, meaning-making, and moral framing of suffering**
   "I pray to God a lot to take away the pain." (P7)
4. **Pain management and interactions with the healthcare system**
   "You have to complain to get them to give you medication." (P8)
5. **Social context, responsibilities, and life disruptions**
   "It's nice here, but I need to get to my house because I have my children." (P10)

Key finding: Many patients reported acceptable or improving numerical pain scores despite describing substantial physical and emotional suffering, suggesting standard pain scales alone may not fully capture patients' lived experiences.

Discussion

- Trauma patients in rural Guatemala described pain as a complex, lived experience shaped by physical, psychological, spiritual, and sociocultural factors.
- Unidimensional pain scores frequently underestimated the overall burden of suffering, emphasizing the limitations of relying solely on pain intensity ratings.
- Discordance persisted even with a Wong-Baker FACES scale. Stoicism and a cultural norm of non-complaint may lead numerical tools to underestimate pain.
- Analgesia was often reactive. Patients deferred to providers and adjusted expectations to resource scarcity.
- Spirituality and family were core coping resources. Concerns about work, finances, and caregiving often outweighed pain intensity itself.
- These findings support culturally informed, patient-centered approaches to trauma pain management that integrate effective analgesia with attention to patients' psychological well-being, spirituality, family responsibilities, and functional recovery.
- Limitations: single site, bedside interviews in shared wards (possible social desirability bias), no member checking, indigenous-language speakers not represented.

Conclusion

- Patients often minimized pain numerically despite describing substantial suffering, suggesting that pain scores alone may inadequately capture the lived experience of pain in this setting.
- **Implications for practice:**
  - Supplement pain scores with questions on function, sleep, mood, and daily activities
  - Use proactive, systematic pain assessment and normalize asking for pain relief
  - Acknowledge spirituality, involve family, and frame care around return to work and caregiving
  - Advocate for adequate analgesic formulary and staffing

Sources / Disclosures

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